

IN THE ABSTRACT

Please replace the present abstract with the following:

ABSTRACT OF THE DISCLOSURE

Systems and method are described for ~~CDMA~~ pilot channel tracking for synchronization. A method of tracking a pilot channel includes: downconverting the RF signal to a low frequency that is of the order of, but greater than the chip rate; converting the signal into digital format; computing complex correlations between the received digital signal and local replicas of the PN codes; and establishing from the correlation values what is the nominal frequency error of the local oscillator. ~~The systems and method provide advantages because pilot~~ Pilot signal tracking accuracy is improved, computational load is reduced without any degradation in performance, and the technique is simple enough to be incorporated in an off-the-shelf FPGA.